

### **LISTING OF THE CLAIMS**

The following is a listing of claims pending in the application.

- 1-7.     **(Cancelled)**
8.       **(Previously Presented)**   A long wavelength vertical cavity surface emitting laser comprising:
- a substrate;
  - a first mirror proximate said substrate and having a plurality of layers including at least one pair of layers having a non-oxidized AlGaInAs layer and an oxidized layer, wherein the oxidized layer comprises at least one of oxidized InGaAsP, InAlAs, InAlGaAs, AlAsSb, AlGaAsSb, AlGaPSb or AlPSb;
  - a cavity proximate to said first mirror;
  - a second mirror proximate to said cavity, said second mirror comprising a partially oxidized layer for confining current; and
  - at least two contacts configured to cause current to flow through at least a portion of the vertical cavity surface emitting laser.
9.       **(Original)**           The laser of claim 8, wherein said first mirror is proximate to an InP substrate.
10.      **(Previously Presented)**   The laser of claim 12, wherein the at least one quantum well is configured to emit energy at a wavelength greater than 1200 nm.
11.      **(Previously Presented)**   The laser of claim 8, wherein said second mirror comprises a plurality of layers having at least one InP layer.
12.      **(Previously Presented)**   The laser of claim 8, wherein said cavity has at least one quantum well.
13.      **(Cancelled)**

14.     **(Previously Presented)** The laser of claim 8, further comprising:  
a first electrical contact on said second mirror; and  
a second electrical contact on the substrate.
15.     **(Previously Presented)** The laser of claim 8, further comprising:  
an intra-cavity contact layer situated between said first mirror and said cavity;  
a first contact on said second mirror; and  
a second contact on said intra-cavity contact layer.
- 16-35. **(Cancelled)**
36.     **(Previously Presented)** The laser of claim 8, wherein the plurality of layers of the first mirror has six or fewer pairs of layers.
37.     **(Cancelled)**